

Remarks/Arguments

Applicants have received and carefully reviewed the Office Action mailed March 19, 2010. Claims 14-36 remain pending. Claims 14-30, 32, and 34-35 have been amended. Support for the amendments can be found in the specification, claims, and drawings as originally filed. No new matter has been added. Favorable reconsideration is respectfully requested in light of the following remarks.

Rejections under 35 U.S.C. § 103(a)

Claims 14, 16, 19-31 and 32-36 were rejected under 35 U.S.C. 103(a) as being unpatentable over DE 197 33 768 in view of US 3,072,390 (Phillips) and GB 1397536. Applicants respectfully disagree.

First, it is noted that DE 197 33 768 is in German, and the English abstract provides few details of the construction of the device. A machine translation of the specification of DE 197 33 768 does not appear to describe the claimed elements, but did yield the following statement: "The figures of the design show the article according to invention partly strongly schematized and are not necessarily full-scale to be understood." (Column 2, lines 60-63, translated at <http://balefish.yahoo.com>). Applicants submit that it is improper to infer any specific construction from the "strongly schematized" figures of the reference, if that is where the Examiner believes that feature is taught. Because DE 197 33 768 is in not in the English language, Applicants respectfully request that the Examiner obtain a translation of those parts relied upon by the Examiner if the Examiner elects to maintain this rejection.

In any event, none of DE 197 33 768, Phillips, or GB 1397536 appear to teach many of the elements of the claims. Turning first to claim 14, which recites:

14. (Currently Amended) A mixing device for mixing gas provided by a gas regulating device with ~~and~~ combustion air for a gas burner, comprising:
a monolithic housing defining:
 an air inlet;
 an outlet;
 a first fluid path extending between the air inlet and the outlet;
 a venturi nozzle situated in the fluid path between the air inlet and
 the outlet;
 a gas inlet;
 a second fluid path extending from the gas inlet to the venture
 nozzle of the housing;

~~wherein the gas inlet is, the housing having a first fastener member configured as a female receptacle for receiving to receive a protruding outlet stub of the gas regulating device;~~
~~a first releasable fastener that releasably fastens the gas regulating device relative to the monolithic housing, with the protruding outlet stub of the gas regulating device in a sealing relationship with the gas inlet of the housing, the first releasable fastener being hand releasable by a user such that the gas regulating device can be quickly removed and separated from the housing; and~~
~~a second releasable fastener that releasably fastens the monolithic housing to a support plate of a blower with the outlet of the monolithic housing in fluid communication with an aperture in the support plate of the blower, the second releasable fastener being hand releasable by a user such that the monolithic housing can be quickly removed and separated from the blower.~~
~~, and a second fastener member configured to interface with a supporting plate of a blower; and~~
~~a venturi nozzle, wherein the venturi nozzle, the first and the second fastener members are integrated in the housing in such a way that the housing, the first and second fastener members and the venturi nozzle are formed as a monolithic unit.~~

None of DE 197 33 768, Phillips, or GB 1397536, taken alone or in combination, appear to teach many of the elements of claim 14 including, for example, a monolithic housing that defines: (1) an air inlet; (2) an outlet; (3) a first fluid path extending between the air inlet and the outlet; (4) a venturi nozzle situated in the fluid path between the air inlet and the outlet; (5) a gas inlet; (6) a second fluid path extending from the gas inlet to the venture nozzle of the housing; (6) wherein the gas inlet is configured as a female receptacle for receiving a protruding outlet stub of the gas regulating device. Nor do DE 197 33 768, Phillips, or GB 1397536, taken alone or in combination, appear to teach a first releasable fastener that releasably fastens the gas regulating device relative to the monolithic housing, with the protruding outlet stub of the gas regulating device in a sealing relationship with the gas inlet of the housing, the first releasable fastener being hand releasable by a user such that the gas regulating device can be quickly removed and separated from the housing, and a second releasable fastener that releasably fastens the monolithic housing to a support plate of a blower with the outlet of the monolithic housing in fluid communication with an aperture in the support plate of the blower, the second releasable fastener being hand releasable by a user such that the monolithic housing can be quickly removed and separated from the blower, particularly in combination with the other elements of the claim. Notably, the so-called gas outlet stub (cited as 64 in Phillips, see Figure 5) of a gas

regulating device of Phillips appears to be part of the overall carburettor assembly, and would not appear to be part of a gas regulating device that is easily or quickly removed and separated from a mixing device. For these and other reasons, claim 14 is believed to be clearly patentable over DE 197 33 768, Phillips, and GB 1397536. For similar and other reasons, claims 15-25, which depend from claim 14 and include significant additional distinguishing features, are also believed to be clearly patentable over DE 197 33 768, Phillips, and GB 1397536.

Turning now to claim 26, which recites

26. (Currently Amended) A gas burner, comprising:
a combustion chamber;
a mixing device configured to mix gas and combustion air, the mixing device including:
a monolithic housing defining with a venturi nozzle, wherein the venturi nozzle is integrated in the housing in such a way that the housing and the venturi nozzle are formed as a single piece monolithic unit;
a blower having a support supporting plate;
wherein the monolithic housing further includes [[a]] one or more integral fastener features member configured to receive releasably interlock with corresponding features of the supporting support plate of the blower; and
the blower, when activated, acts on the mixing device to suck in a mixture of gas and combustion air provided by the mixing device and feeding the mixture to the combustion chamber of the gas burner.

None of DE 197 33 768, Phillips, or GB 1397536, taken alone or in combination, appear to teach many of the elements of claim 26 including, for example, a monolithic housing defining a venturi nozzle, wherein the venturi nozzle is integrated in the housing in such a way that the housing and the venturi nozzle are formed as a single piece, a blower having a support plate, and wherein the monolithic housing includes one or more integral fastener features configured to releasably interlock with corresponding features of the support plate of the blower, wherein the blower, when activated, acts on the mixing device to suck in a mixture of gas and combustion air provided by the mixing device and feed the mixture to the combustion chamber of the gas burner.

While GB 1397536 may disclose a bayonet type joint generally in the gas burner field, GB 1397536 does not appear to teach the specifically recited structure including, for example, a monolithic housing that includes one or more integral fastener features configured to releasably interlock with corresponding features of a support plate of a blower, particularly in combination with the other elements of the claim. Further, there would appear to be no motivation or other

reason to modify DE 197 33 768 and Phillips to arrive at the particular gas burner recited in claim 26. For these and other reasons, claim 26 is believed to be clearly patentable over DE 197 33 768, Phillips, and GB 1397536. For similar and other reasons, claims 27-33, which depend from claim 26 and include significant additional distinguishing features, are also believed to be clearly patentable over DE 197 33 768, Phillips, and GB 1397536.

Turning now to claim 34, which recites:

34. (Currently Amended) A mixing device for mixing gas and combustion air for a gas burner, said mixing device comprising:
a monolithic housing, the housing having:
side walls that define a venturi nozzle that forms a flow duct, the flow duct having an inlet ~~opening~~ for accepting combustion air and an outlet ~~opening~~ for providing a mixture of gas and combustion air;
a gas inlet ~~opening~~ extending through a side wall of the housing and into the flow duct intermediate the inlet and the outlet of the monolithic housing, the gas inlet opening configured to interface with defining a recess for receiving a gas outlet port stub of a gas regulating device situated in a gas regulating device housing; and
wherein the gas inlet of the monolithic housing is configured to interface with includes a fastener member configured to receive the gas outlet port stub of the gas regulating device; and
a releasable fastener for releasably fastening the monolithic housing to the gas regulating device gas outlet stub, wherein the housing, venturi nozzle, gas inlet opening, and fastener member are formed as a monolithic element such that a gas tight seal is formed between the gas inlet of the monolithic housing and the gas outlet port of the gas regulating device, the releasable fastener being hand releasable by a user such that the gas regulating device can be quickly removed and separated from the monolithic housing.

For similar reasons to those discussed above, claim 34 is believed to be clearly patentable over DE 197 33 768, Phillips, and GB 1397536. For similar and other reasons, claims 35-36, which depend from claim 34 and include significant additional distinguishing features, are also believed to be clearly patentable over DE 197 33 768, Phillips, and GB 1397536.

Claims 15, 17 and 18 were rejected under 35 U.S.C. 103(a) as being unpatentable over DE 197 33 768 in view of US 3,072,390 (Phillips) and GB 1397536, and further in view of Sang. Applicants respectfully disagree. For at least the reasons set forth above, claim 14 is believed to be clearly patentable over DE 197 33 768 in view of US 3,072,390 (Phillips) and GB 1397536.

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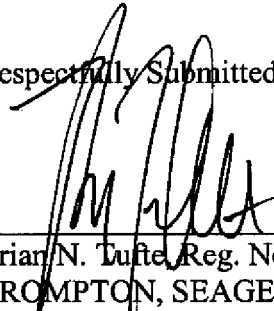
Sang does not appear to remedy the noted shortcomings of DE 197 33 768, US 3,072,390 (Phillips) and GB 1397536. Thus, for these and other reasons, claims 15, 17 and 18, which depend from claim 14 and include significant additional distinguishing features, are believed to be clearly patentable over DE 197 33 768, US 3,072,390 (Phillips), GB 1397536 and Sang.

Conclusion

In view of the foregoing, all pending claims 14-36 are believed to be in condition for allowance. Reexamination and reconsideration are respectfully requested. If a telephone conference might be of assistance, the Examiner is encouraged to contact the undersigned attorney at (612) 359-9348.

Respectfully Submitted,

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